

# **[DVD-ROM CONTROLLER AND MPEG DECODER WITH SHARED MEMORY CONTROLLER]**

## **Abstract of Disclosure**

An electronic circuit has a DVD-ROM controller, an MPEG decoder and a single memory controller. The DVD-ROM controller controls a Disk drive loader to obtain encoded data from a removable media, such as a DVD disk or a VCD disk. The DVD-ROM controller also performs an ECC decoding process to obtain decoded data from the encoded data, and stores the decoded data in an external memory. The MPEG decoder decodes graphics data held in the external memory to generate video data and audio data. The memory controller provides read and write access to the external memory for both the DVD-ROM controller and the MPEG decoder. The MPEG decoder performs an MPEG decoding process on the decoded data held in the external memory to generate the video data.

## Figures